

United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
10/025,879	12/26/2001	Hyung Cheol Moon	P-0290	9272	
34610 7.	590 09/20/2006		EXAMINER		
	FLESHNER & KIM, LLP P.O. BOX 221200 CHANTILLY, VA 20153 GREY, CHRISTOPHER P ART UNIT PAPER NUMBE		GREY, CHRISTOPHER P		
			PAPER NUMBER		
			2616	=	

DATE MAILED: 09/20/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

eN
S [

	Application No.	Applicant(s)			
	10/025,879	MOON, HYUNG CHEOL			
Office Action Summary	Examiner	Art Unit			
	Christopher P. Grey	2616			
The MAILING DATE of this communication ap	ppears on the cover sheet with the	correspondence address			
Period for Reply					
A SHORTENED STATUTORY PERIOD FOR REP WHICHEVER IS LONGER, FROM THE MAILING [- Extensions of time may be available under the provisions of 37 CFR 1 after SIX (6) MONTHS from the mailing date of this communication If NO period for reply is specified above, the maximum statutory period: - Failure to reply within the set or extended period for reply will, by statu Any reply received by the Office later than three months after the maili earned patent term adjustment. See 37 CFR 1.704(b).	DATE OF THIS COMMUNICATIO .136(a). In no event, however, may a reply be to d will apply and will expire SIX (6) MONTHS fror te, cause the application to become ABANDON	N. mely filed n the mailing date of this communication. ED (35 U.S.C. § 133).			
Status					
1)⊠ Responsive to communication(s) filed on 26	December 2001.				
<u> </u>	· · · · · · · · · · · · · · · · · · ·				
3)☐ Since this application is in condition for allow	3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is				
closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.					
Disposition of Claims					
	are nending in the application				
4) Claim(s) 1-4,7-11,14-19,21-24 and 26-35 is/are pending in the application. 4a) Of the above claim(s) is/are withdrawn from consideration.					
5) Claim(s) is/are allowed.					
6)⊠ Claim(s) <u>1-4,7-11,14-19,21-24 and 26-35</u> is/a	re rejected.				
7)☐ Claim(s) is/are objected to.					
8) Claim(s) are subject to restriction and/	or election requirement.				
Application Papers					
9)☐ The specification is objected to by the Examin	ar				
10) The drawing(s) filed on is/are: a) ac		Examiner			
Applicant may not request that any objection to the					
Replacement drawing sheet(s) including the corre		, ,			
11)☐ The oath or declaration is objected to by the E					
Priority under 35 U.S.C. § 119					
12)⊠ Acknowledgment is made of a claim for foreig	n priority under 35 U.S.C. § 119(a	a)-(d) or (f).			
a)⊠ All b)□ Some * c)□ None of:		, , , ,			
1. Certified copies of the priority documer	nts have been received.				
2. Certified copies of the priority documents have been received in Application No					
3. Copies of the certified copies of the priority documents have been received in this National Stage					
application from the International Burea	au (PCT Rule 17.2(a)).				
* See the attached detailed Office action for a lis	t of the certified copies not receiv	ed.			
Attachment(s)					
1) Notice of References Cited (PTO-892)	4) Interview Summar				
2) Notice of Draftsperson's Patent Drawing Review (PTO-948)	Paper No(s)/Mail D	Date			
Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date	5) Notice of Informal 6) Other:	Patent Application			
J.S. Patent and Trademark Office					
PTOL-326 (Rev. 08-06) Office A	Action Summary	Part of Paper No./Mail Date 1			

Art Unit: 2616

DETAILED ACTION

Page 2

Claim Objections

Claim 24 is objected to because of the following informalities:
 In claim 24 line 6, "pocket" should be deleted and replaced with "packet"

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

Appropriate correction is required.

(e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.

The changes made to 35 U.S.C. 102(e) by the American Inventors Protection Act of 1999 (AIPA) and the Intellectual Property and High Technology Technical Amendments Act of 2002 do not apply when the reference is a U.S. patent resulting directly or indirectly from an international application filed before November 29, 2000. Therefore, the prior art date of the reference is determined under 35 U.S.C. 102(e) prior to the amendment by the AIPA (pre-AIPA 35 U.S.C. 102(e)).

2. Claims 1, 2, 3, 4, 7, 9, 10, 11, 14, 16, 17, 18, 19, 21, 22, 23, 24, 26, 27, 28, 29, 32, 33, 35 are rejected under 35 U.S.C. 102(e) as being anticipated by Derryberry et al. (US 6498785), hereinafter referred to as Derryberry.

Art Unit: 2616

Claim 1, 10, 17, 22 Derryberry discloses transmitting a preliminary signal (Col 8 lines 10-46, fig 4, 402, initial access probe) with a first transmission power from the first station (MS) to a second station (BS).

Derryberry discloses transmitting a first packet data from the first station to the second station with the first transmission power (fig 4 element 410, begins transmission of data). Also, Derry berry discloses power control occurring based on a number of factors, where a possible increase or decrease power command may be applied based on the results of a determination (Col 10 lines 25-55). That increase or decrease may be by 0, where no power adjustment is made based on the determination.

Derryberry discloses increasing the transmission power of the first station to an increased second transmission power if the first packet data transmission is not successfully received by the second station (Col 11 lines 6-47, power control continues til entire frame is finished, and element 420 in fig 4, adjust/increase power).

Derryberry discloses transmitting a second packet data from the first station to the second station with the increased second transmission power (Col 11 lines 38-47).

Claim 2, 11 Derryberry discloses ending the packet data transmission when the packet data transmission is successfully received by the second station (Col 11 lines 6-24).

Claim 3, 18, 19, 23, 24 Derryberry discloses transmitting a preamble from the first station to the second station (Col 8 lines 9-46), and receiving a channel occupying signal from the second station (BS) as a response to the preamble (Col 8 lines 47-67, control information and data).

Art Unit: 2616

Claim 4 Derryberry discloses ending the packet data transmission process if the channel occupying signal is not received from the second station (power control ends when the transmission of frames is complete, Col 11 lines 6-23 and element 422, in fig 4).

Claim 7, 14, 21, 26 Derryberry discloses the increased second transmission power being calculated based on the first transmission power used by the first station in the first packet data transmission to the second station, a controlled amount of the transmission power by the second station, a changed amount of power received at the first station, and a channel compensating value of the second station (Col 9 lines 56-Col 10 line 55).

<u>Claim 9, 16</u> Derryberry discloses the first station being a mobile communication station and the second station being a base station (see figs 2 and 3).

Claim 27 Derryberry discloses means for increasing the transmission power calculating the increased transmission power based on a channel compensating value received from the second station (Col 10 lines 29-50, parameter set value).

Claim 28 Derryberry discloses receiving a channel compensating value from the second station (element 408 in fig 4).

Claim 29, 32, 33, 35 Derry berry discloses calculating the increased second transmission power based on the channel compensating value received from the second station (Col 10 lines 29-55).

Application/Control Number: 10/025,879 Page 5

Art Unit: 2616

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

- (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 3. Claims 30, 31, 34 rejected under 35 U.S.C. 103(a) as being unpatentable over Derryberry (US 6498785) in view of the prior art disclosed by the applicant.

<u>Claim 30</u> Derryberry does not specifically disclose the preliminary signal comprising a collision detect signal.

The prior art disclosed by the applicant discloses the preliminary signal comprising a collision detect signal (see fig 4 labeled prior art and relevant text).

It would have been obvious to one of the ordinary skill in the art at the time of the invention to modify the transmission of the preamble as disclosed by Derryberry, with the addition of a collision detect signal as disclosed by the prior art disclosed by the applicant. The motivation for this modification is is for preventing impacts when more than one mobile station requests allocation of the same channel at the same time (paragraph 17)

<u>Claim 31, 34</u> Derryberry does not specifically disclose the channel occupying signal comprising a CD-ACH signal.

The prior art disclosed by the applicant discloses the channel occupying signal comprising a CD-ACH signal (see fig 4 labeled prior art and relevant text).

Application/Control Number: 10/025,879

Art Unit: 2616

Page 6

It would have been obvious to one of the ordinary skill in the art at the time of the invention to modify the transmission of the power control command as disclosed by Derryberry, with the addition of a CD-ACH signal as disclosed by the prior art disclosed by the applicant. The motivation for this modification is to receive a response to the transmitted preamble (paragraph 17).

4. Claims 8 and 15 are rejected under 35 U.S.C. 103(a) as being unpatentable over Derryberry (US 6498785) in view of Bark et al. (US 6628956), hereinafter referred to as Bark.

Claim 8, 15 Derry berry does not specifically disclose the transmission power being determined by summing the first transmission power used in the first packet data transmission, the controlled amount of the transmission power by the second station, the changed amount of power received at the first station, and the channel compensating value of the second station.

Bark discloses a power control procedure, whereina number of different values are used to adjust a power value, where the summation of the first transmission power used in the first packet data transmission, the controlled amount of the transmission power by the second station, the changed amount of power received at the first station, and the channel compensating value of the second station is applicable (Col 8 lines 28-67 and see fig 7).

It would have been obvious to one of the ordinary skill in the art at the time of the invention that the increase or decrease of power as disclosed by Derryberry could be

modified so as to conform to an increase or decrease based on variable parameters in order to achieve power control, such as the variables and power control as disclosed by Bark.

Response to Arguments

- 5. Applicant's arguments filed March 3, 2006 have been fully considered but they are not persuasive.
- (a) In claim 27, 29, 32 and 33, the applicant claims a channel compensating value, however does not define the value, making it open for a broad interpretation.

 Furthermore, the applicant claims to receive the value, however does not disclose where the value is being received, making it open to a broad interpretation.
- (b) The applicant argued that Derryberry does not specifically disclose transmitting a preliminary signal at a first power level, making distinct reference to Derryberry transmitting an access probe at increasing power levels.

The examiner maintains that the argued limitation is contained within the rejection of claim 1, seeing that the probe signal is sent as a prelimary signal, and the power at which it is acknowledged by the base station is equivalent to a first power (see claim 1).

(c) The applicant argued that Derryberry does not specifically disclose the second transmission power being determined based on one of the previous transmission power of the mobile terminal and control information.

The examiner maintains that the same limitation interpreted in its broadest term has already been discussed within the rejection of claim 1, wherein Derryberry discloses the increased second transmission power being calculated based on the first transmission power used by the first station in the first packet data transmission to the second station, a controlled amount of the transmission power by the second station, a changed amount of power received at the first station, and a channel compensating value of the second station (Col 9 lines 56-Col 10 line 55).

(d) The applicant argued that the Derryberry does not disclose various limitations defined within claim 22, however gives no support of how the cited references do not cover the subject matter claimed. For these arguments pertaining to claim 22, please refer to the detailed rejection of claim 22.

Conclusion

6. THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of

Application/Control Number: 10/025,879

Art Unit: 2616

the advisory action. In no event, however, will the statutory period for reply expire later

than SIX MONTHS from the mailing date of this final action.

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Christopher P. Grey whose telephone number is

(571)272-3160. The examiner can normally be reached on 7:30-5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Chau Nguyen can be reached on (571)272-3126. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Christopher Grey

Examiner

Art Unit 2616

CHAU NGUYEN SUPERVISORY PATENT EXAMINER

leme To Norm

Page 9

TECHNOLOGY CENTER 2600